

Attorney Docket No. 9391-2  
Application Serial No. 10/085,526  
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This listing of the claims replaces all prior versions in the application.

**Listing of Claims:**

1. (Previously Presented) Resorbable bone replacement and bone formation material based on porous  $\beta$ -tricalcium phosphate ( $\beta$ -TCP), produced by

(a) baking a phosphate powder of a chemical composition having residue on baking which yields theoretically chemically pure tricalcium phosphate;

(b) forming blanks having microporosity using the baked  $\beta$ -tricalcium phosphate ( $\beta$ -TCP); and

(c) providing the baked blanks with substantially tubular pores, wherein

the  $\beta$ -tricalcium phosphate ( $\beta$ -TCP) is baked at least twice and the formation of the thermodynamically stable adjacent phases of  $\beta$ -TCP is inhibited, wherein the method further comprises;

(i) powdering a presynthesis product obtained according to step (a),

(ii) optionally baking the powdered presynthesis product together with phosphate powder according to step (a) and powdering the material obtained and optionally repeating step (ii) at least once;

(iii) compressing the powdered product obtained in step (i) or step (ii) to form the blanks of step (b) and subjecting the blanks formed to final ceramic baking; and

(iv) subjecting the baked blanks, at least about 99.5% of which consists of pure  $\beta$ -tricalcium phosphate ( $\beta$ -TCP), to step (c), wherein the baked blanks are resorbable *in vivo*.

2. (Previously Presented) Formation material according to claim 1, wherein the formation material has chemical and crystalline purity, a structure, microporosity and macroporosity that make possible rapid, foreign-body-reaction-free, biochemically orientated integration and resorption in bone.

3. (Previously Presented) Resorbable bone replacement and bone formation material, produced by

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